

**Request to Archive  
With The National Centers for Environmental Information  
For NEXRAD Quantitative Precipitation Estimates (QPE) Climate Data Record (CDR)  
Provided by NCEI**

**2017-03-24**

This information will be used by NCEI to conduct an appraisal and make a decision on the request.

**1. Who is the primary point of contact for this request?**

Brian Nelson  
NCDC  
828-271-4490  
brian.nelson@noaa.gov

**2. Name the organization or group responsible for creating the dataset.**

DOC/NOAA/NESDIS/NCEI > National Centers for Environmental Information, NESDIS, NOAA, U.S. Department of Commerce

**3. Provide an overview summarizing the scope of data you want to archive. Describe the outputs, data variables, including their measurement resolution and coverage.**

This CDR dataset will contain Radar reflectivity, Precipitation Flag, and Radar Quality Index for 5-minute at 1km regular grid over CONUS from 2001/01 to 2012/12. Radar and Gauge Quantitative Precipitation Estimates (QPE) and Radar only Quantitative Precipitation Estimates at an hourly scale at 1km regular grid over CONUS. This data is used for numerous two-dimensional multiple-sensor products offer assistance for hail, wind, tornado, quantitative precipitation estimation forecasts, convection, icing, and turbulence diagnosis.

**4. What is the time period covered by the dataset? (YYYY-MM-DD, YYYY-MM or YYYY)**

From 2001-01-01 to 2012-12-31

**5. Edition or version number(s) of the dataset:**

1

**6. Approximate date when the dataset was or will be released to the public:**

2017-07-17

**7. Who are the expected users of the archived data? How will the archived data be used?**

CDR users. This data is used for numerous two-dimensional multiple-sensor products offer assistance for hail, wind, tornado, quantitative precipitation estimation forecasts, convection, icing, and turbulence diagnosis.

**8. Has the dataset undergone user evaluation and/or an independent review process? Did NCEI participate in design reviews?**

This is an NCEI developed data set along with NSSL that has undergone internal design as well as internal project management. And now is under CDRP standards.

**9. Describe the dataset's relationship to other archived datasets, such as earlier versions or related source data. If this is a new version, how does it improve upon the previous version(s)?**

The NEXRAD level II archive is the input for this data set.

**10. List the input datasets and ancillary information used to produce the data.**

The NEXRAD level II archive is the input for this data set. The RUC data is also an input to the production.

**11. List web pages and other links that provide information on the data.**

<http://www.nssl.noaa.gov/projects/q2/>

**12. List the kinds of documents, metadata and code that are available for archiving. For example, data format specifications, user guides, algorithm documentation, metadata compliant with a standard such as ISO 19115, source code, platform/instrument metadata, data/process flow diagrams, etc.**

1. CDR CATBD and CDR source code

**13. Indicate the data file format(s).**

1. netCDF-4

**14. Are the data files compressed?**

gzip

**15. Provide details on how the files are named and how they are organized (e.g., file\_name\_pattern\_YYYYMM.tar in monthly aggregations).**

NEXRADQPE\_v01r00\_CDR\_RGQPE\_d20150101\_c20151105.tar.gz

NEXRADQPE\_v01r00\_CDR\_PRATE\_d20150101\_c20151105.tar.gz

NEXRADQPE\_v01r00\_CDR\_MOS2D\_d20150101\_c20151105.tar.gz

NEXRADQPE\_v01r00\_CDR\_PFLAG\_d20150101\_c20151105.tar.gz

MRMSReanalysis\_v01r00\_RQIND\_d20150101\_c20151105.tar.gz

**16. Explain how to access sample data files and/or a file listing for previewing. If it is not available now, when will it be available?**

Request from NCEI CEB to order from CLASS for the MRMS QPE. The updated version will be available through the CDR project.

**17. What is the total data volume to be submitted?**

**Historic Data: all historic data or data submitted as a completed collection.**

Total Data Volume: 3.5TB

Number of Data Files: 16418

**18. Are later updates, revisions or replacement files anticipated? If so, explain the conditions for submitting these additional data to the archive.**

As improvements to the algorithm happen there should be a reprocessing.

**19. Describe the server that will connect to the ingest server at NCEI for submitting the data.**

Physical Location: Asheville,NC

System Name: CICSNC

System Owner: Cooperative Institute for Climate and Satellites - North Carolina

Additional Information: NC State University

**20. What are the possible methods for submitting the data to NCEI? Select all that apply.**

1. SFTP PUSH

**21. Identify how you would like NCEI to distribute the data. Web access support depends on the resources available for the dataset.**

1. User interface to order and stage data for download
2. Direct download links
3. Advanced web services (e.g., THREDDS Catalog Service)

**22. Will there be any distribution, usage, or other restrictions that apply to the data in the archive?**

No known constraints apply to the data.

**23. Discuss the rationale for archiving the dataset and the anticipated benefits. Mention any risks associated with not archiving the dataset at NCEI.**

This data is used for numerous two-dimensional multiple-sensor products offer assistance for hail, wind, tornado, quantitative precipitation estimation forecasts, convection, icing, and turbulence diagnosis. Creates a CDR for a domain/theme that doesn't have many CDRs, precipitation.

**24. Are the data archived at another facility or are there plans to do so? Please explain.**

No

**25. Is there an existing agreement or requirement driving this request to archive? Have you already contacted someone at NCEI?**

CDRP agreement. Will mirror/update to existing SA for MRMS QPE from 2016. AB-SA-01608\_R0

**26. Do you have a data management plan for your data?**

No

**27. Have funds been allocated to archive the data at NCEI?**

CDRP funding

**28. Identify the affiliated research project, its sponsor, and any project/grant ID as applicable.**

Climate Data Record Program

**29. Is there a desired deadline for NCEI to archive and provide access to the data?**

Archive by: 2017-06-16

Accessible by: 2017-07-31

**30. Add any other pertinent information for this request.**

MOU is currently being worked between NCEI, NSSL and Univ. Oklahoma to allow data to more than .mil and .gov users.